

### IN THE CLAIMS

Please amend the claims as follows:

Claim 1 (Original): A process for separating off water from a tert-butanol (TBA)/water mixture by

- a) distilling the TBA/water mixture to give a TBA/water azeotrope and a water-free TBA stream,
- b) separating the water from the TBA/water azeotrope by means of a membrane to give a stream comprising predominantly TBA and a stream comprising predominantly water and
- c) recirculating the stream comprising predominantly TBA to the distillation of stage a).

Claim 2 (Original): The process as claimed in claim 1, wherein, prior to the distillation of stage a), the TBA/water mixture is fractionated to give an aqueous bottom product and a TBA-containing top product which is fed to the distillation of stage a).

Claim 3 (Currently Amended): The process as claimed in claim 1 ~~or 2~~, wherein the recirculation of the stream comprising predominantly TBA in stage c) is wholly or partly to the membrane separation of stage b).

Claim 4 (Currently Amended): The process as claimed in ~~any of claims 1 to 3~~ claim 1, wherein the stream comprising predominantly water from stage b) is fractionated to give a TBA/water azeotrope and water and the TBA/water azeotrope is recirculated to the distillation of stage a) and/or to the membrane separation of stage b).

Claim 5 (Currently Amended): The process as claimed in ~~any of claims 1 to 4~~ claim 1, wherein the membrane separation of stage b) is carried out by pervaporation.

Claim 6 (Currently Amended): The process as claimed in ~~any of claims 1 to 4~~, claim 1, wherein the membrane separation of stage b) is carried out by vapor permeation.

Claim 7 (Currently Amended): The process as claimed in ~~any of claims 1 to 4~~ claim 1, wherein the membrane separation of stage b) is carried out by vapor permeation and pervaporation.

Claim 8 (Currently Amended): The process as claimed in ~~any of claims 1 to 7~~ claim 1, wherein the water-free TBA stream obtained in stage a) has a water content of 10-5000 ppm by mass.

Claim 9 (Currently Amended): The process as claimed in ~~any of claims 1 to 8~~ claim 1, wherein the stream comprising predominantly water obtained in stage b) has a TBA content of from 10 to 0.5% by mass.